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The Fighter Support Experimental (FS-X) Aircraft  
An Analysis of Events And Decision Processes

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## Introduction.

The development of national security policy is a complex process which results from the input, rationalizations, and decisions of major players in positions at the highest levels of government. Decisions which emerge do not necessarily follow expected formal decision making procedures, but are the resolution of a variety of competing forces. These forces reflect not only the "invitation to struggle" that the framers of the Constitution anticipated, particularly between the executive and legislative branches of government, but also significant contributions from the "bureaucracy". The recent Fighter Support-Experimental (FS-X) codevelopment agreement between the U.S. and Japan provides a good example for analysis of this phenomenon. The FS-X involves military, nonmilitary, bureaucratic, and political elements, the final orchestration of which has yet to be played out.

This paper will trace a selected, but important, series of actions by FS-X stake holders in U.S.-Japanese relations during the late 1980s. An effort will be made to explain how the decision process functioned by highlighting the influences on the decision makers and the manner in which conflict was resolved or abrogated in formulating policy.

In conclusion, I'll attempt to categorize the policy decision process using a series of conceptual models developed by Graham T. Allison.[1] The Allison models provide a logical framework to assess the impact of the "bureaucratic perspective" on policy development and constitute an additional mechanism to gain insight into the national security decision process.

## Background.

The Japanese Air Self Defense Force (ASDF) is equipped with two groups of fighters. F4EJs and F15s are designed for air to air superiority while the F-1 fighter support aircraft is designed to primarily counter seaborne landing invasion forces.[2]

The F-1, Japan's first domestically produced fighter aircraft, was initially introduced in the mid 1970s. Shortly thereafter, it was announced by the Japan Defense Agency (JDA) that planning for a replacement aircraft would be initiated because the F-1s would wear out and become obsolete by the end of the 1990s.[3]

Beginning in the late 1970s U.S. aircraft manufacturers unsuccessfully tried to market the U.S. F-15 and F-16 aircraft for direct sale or licensed production in Japan as replacements for the aging F-1. But American defense companies met stiff resistance from the Japanese Defense Agency's preference for buying Japanese.[4]

From the start, it was apparent that the Japanese wanted to develop their own replacement. The deployment of the new aircraft, labeled the Fighter Support-Experimental (FS-X), was scheduled to begin in 1997, and its selection required a reevaluation of Japan's strategy in the changing military environment of East Asia. For the Japanese, the FS-X was a major undertaking because it would replace an entire class of fighter support. From an industrial and strategic point of view, there were important considerations in the Japanese decision for domestic development. The Japanese intended the FS-X to drive the growth of the country's aerospace industry for the rest of the century. It was anticipated that over 100 F-1s would be replaced and that Japan's biggest defense contractor, Mitsubishi Heavy Industries, would be selected as the prime contractor.[5],[6]

Originally the FS-X development was a unilateral Japanese issue, and, until 1985, American involvement was somewhat limited. However, in 1985 the U.S. Aerospace industry appealed to the Departments of Defense and Commerce for assistance in penetrating the Japanese market for the new support fighter. The Defense Department (DOD) increased its efforts to influence Japan to consider an existing U.S. fighter or to enter into a codevelopment agreement using a U.S. aircraft as a base to fulfill unique Japanese requirements.

In October 1987 the Japanese agreed to build the FS-X based on a modification of the American F-16. Defense Secretary Carlucci and Defense Minister Karawa approved the outline of an FS-X Memorandum of Understanding (MOU) in June 1988. The MOU was signed by DOD and the Japanese Defense Agency (JDA) in November 1988. In basic terms the MOU stipulated that Japan would assume all development costs. The U.S. would receive approximately 40% of the development work with roughly an equivalent share of production.[7]

In February 1989, as a result of pressure concerning the transfer of critical U.S. aerospace technologies to the Japanese, President Bush directed a review of the FS-X MOU. Critics of the deal feared that it would result in a giveaway of American technology to Japan. They emphasized that Japan's ultimate objective was not military, but commercial. The FS-X deal would help Japan achieve its goal of launching an aerospace industry that might well take jobs and profits from the United States. Suggestions were made to Tokyo by the White House on the need to clarify the FS-X agreement. In April 1989 the U.S. received the assurances from the Japanese that the Bush Administration sought.[8]

The MOU was presented to Congress for review in May 1989,

and on May 19, 1989, the Senate narrowly approved the FS-X MOU by a vote of 52 to 47.

In July, the House sought to stiffen the terms of the MOU and brokered a Joint Resolution that would "prohibit the export of certain technology, defense articles, and defense services in connection with the codevelopment and coproduction of the FS-X aircraft with Japan." [9]

President Bush vetoed the the resolution stating that it was unnecessarily restrictive to protect the interests of the United States, inconsistent with the Arms Control Export Act, and that certain provisions unconstitutionally infringed on the powers of the Executive. In September 1989, the Congress failed to muster sufficient votes to override the President's veto.

Over the course of approximately ten years, the FS-X project instigated significant controversy among various U.S. government players, and Japanese as well. The United States moved from a position of supportive interest, to pressuring the Japanese into a codevelopment program, to second guessing the terms of the deal. Who were the "stake holders" and what were factors which drove the policy making process?

#### U.S. Aerospace Industry.

American defense industries have long experience with the Japanese Defense Agency's penchant for buying Japanese. In the past 15 years, imports have only accounted for about 10% of Japanese defense procurement spending. In the case of the FS-X, the Japanese government ministries and their client industries were even firmer than usual in closing out foreigners. Although domestic production of the FS-X was the favored position of the Japanese policy makers, consideration was given to an option to explore three foreign candidate aircraft.

The candidates were McDonnell Aircraft Company (F-18), General Dynamics (F-16), and the Tornado, which was developed by a European consortium of Britain, West Germany, and Italy.

But the prospects looked poor for McDonnell Douglas and General Dynamics, and in 1985 the U.S. aerospace industry appealed to the Secretaries of Defense and Commerce for help. Further influencing the situation was an early congressional opponent of the all-Japanese FS-X, Senator John Danforth of Missouri--the home state of both General Dynamics and McDonnell Douglas.[10]

Through the long debate over the FS-X, the U.S. aerospace industry supported the FS-X agreements negotiated with Japan. With an eye to approximately \$2.5 billion of work during the life of the program, industry's motivation to challenge the terms of the deal with Japan was low.

#### Departments of Defense and State.

DOD's primary focus in the FS-X program was to support the basic security needs of Japan and maintain the bilateral security arrangements between Japan and the U.S. DOD recognized the strong support for a domestic Japanese replacement for the F-1 . Although DCD expressed firm belief that current off-the-shelf U.S. fighters could, with little modification, fulfill Japanese security requirements, it became increasingly clear that U.S. candidate fighters were in a losing battle against a Japanese developed FS-X. In 1986, DOD drafted a broad policy statement, coordinated with the State Department, which reflected support of Japan's initiatives to improve its defense posture by developing a new fighter. The policy also supported the interests of U.S. industry within the confines of judicious technology transfer. While DOD argued that American aircraft were the most cost effective and readily

available solution to Japan's aircraft needs, the Japanese failed to respond to attempts by Secretaries of Defense Weinburger and Carlucci to influence the procurement of U.S. planes. Finally, after quiet, high-level discussions, Japan agreed to codevelopment and coproduction with the U.S. of the FS-X based on General Dynamics F-16.

The Defense Department, with its history of cooperation with the Japanese Defense Agency saw little danger in the FS-X program. Pentagon planners indicated that the Japanese would learn little from the aging F-16 airframe. At the same time, the Pentagon expected to gain valuable technology from Japan on new phased array radar and composite wing engineering.

But intrinsic to both the State and Defense Department's position was the bilateral military and foreign policy values that govern U.S. relations with an ally. Implicit, but not explicit, was the understanding shared by both the Departments of Defense and State that it would not be in the best interests of the U.S. to link emerging trade deficit issues with the FS-X development program. [11]

#### Department of Commerce.

While the Pentagon believed it had negotiated a memorandum with Japan that protected U.S. interests, the Commerce department did not.

One of the key concerns expressed by Commerce was whether the technical knowledge transferred to Japan under the FS-X project would be sufficient to allow Japan to narrow the gap with the U.S. in commercial aerospace production. The Commerce Department charged that the technology transfer would give the Japanese sufficient design and integration data to create an independent capability which might ultimately challenge U.S.

preeminence in the field. Additional concerns were raised regarding the vagueness of the language in the original MOU which specified the follow on production share for American industry.[12]

Pressure from Commerce Secretary, Robert A. Mosbacher, and U.S. Trade Representative, Carla Hills, to stop the sale outright resulted in a modified DOD plan which was presented to President George Bush. The modifications guaranteed U.S. participation in the ultimate production of the FS-X as well as set limits on the extent of technology transferred to Japan. The Department of commerce focused on twin issues of competitiveness and an eroding U.S. industrial base to press its position with both the Executive branch and Congress under the context of threats to national security objectives.[13]

The Pentagon argued that the issue of vital American technology transfer had been debated before and that Commerce was merely seeking added turf. Nevertheless, President Bush agreed to give Commerce an expanded role in future military production contracts and the administration sought and received "clarifications" from the Japanese which effectively restructured the DOD FS-X memorandum.

#### Congressional Concerns.

By early 1987, pressures were mounting for a U.S. solution to the FS-X issue. Ironically, this shift was not due to military-strategic deliberations by the defense community in Washington, but rather because of a change in the international monetary environment. The appreciation of the yen noticeably lowered the purchase price of foreign aircraft. The call for a non-Japanese FS-X again echoed from American military industries and the U.S. Congress where the huge bilateral trade imbalance

had targeted Japan for major trade restricting legislation. Because the U.S. trade deficit with Japan was not decreasing, some congressmen began to link security issues with economic problems, and demanded that increased military imports by Japan be used to offset the trade imbalance. Although the Japanese initiated a number of diplomatic efforts to dissociate the FS-X issues from political pressures and reach a consensus in Washington based on military-strategic considerations, further trade related problems were to influence the decision process. In May, 1987, the U.S. House of Representatives approved legislation targeted at Japan for alleged microchip dumping against American producers. The package mandated retaliations against U.S. trading partners for predatory trading practices. A number of ranking U.S. Senators let it be known to Prime Minister Nakasone's special envoy, former Foreign Minister Abe, that recently imposed trade sanctions were symbolic in nature and that "the decision to purchase your new aircraft from the U.S. would be taken, in particular, as a sign of good will by Japan, and as a tangible guarantee of a continuation of our close security relationship." [14]

The idea of linkage was a serious new concern brought to the fore by the FS-X issue. In the past, economic and political issues were carefully separated from security matters. Japanese-American security ties were generally excellent. But linking FS-X construction to the trade deficit reflected the frustration among many legislators that Japan had refused to throw open its doors to American goods. According to California democrat Mel Levine, a member of the House Foreign Affairs Committee, the U.S. shouldn't help Japan build its own jet fighter when "the U.S. builds the best quality, best priced jet fighters in the world. Japan should buy the product from us." [15]

Although Congress paid more than lip service to the technology issues raised by the Commerce Department and some members of the Executive staff, the real dilemma which confronted the legislature was how the U.S. should treat a country that was at once a military ally and a commercial rival. The Congressional answer was to reject the jet agreement submitted by President Bush for review, notwithstanding the revisions gained by the Bush administration strengthening the original MOU.

#### The Executive Branch.

Conscious of polls indicating that many Americans perceived Japan's economic muscle as much a threat to national security as Soviet military might, President Bush made the FS-X an example of U.S. resolve to get tough with Japan by reopening an agreement that the Reagan Administration considered closed.

The Reagan Administration's agreement was heavily criticized by Bush's outspoken Chief of Staff, John Sununu, a former engineering professor, who argued that the U.S. risked losing its technological edge in aerospace without clarification on certain terms of the FS-X agreement. Sununu was joined by Secretary of Commerce, Robert Mossbacher, who seconded Sununu's reservations and added objections concerning the work share U.S. firms would receive for the production phase of the aircraft.

After hearing the objections Bush decided to unilaterally reopen the agreement and press Japan for safeguards to protect U.S. technology and guarantee U.S. workshare on the \$5 to \$10 billion in production contracts to build the new fighter. The Bush Administration, in asking for safeguards in the deal signaled that it considered U.S. industrial competitiveness to be essential to American security.

The Administration's hard line settled the feud between the Defense Department, which championed the deal as a strategic boon for the U.S., and the Commerce Department, which challenged it as a technology giveaway to Japan.[16]

However, President Bush remained convinced that proceeding with the program was in the best interest of the United States. Administration officials obtained the applicable safeguards and "clarifications" from Japan which bolstered the original MOU. President Bush therefore reacted negatively to a joint congressional resolution which sought to further restrict the codevelopment and coproduction of the FS-X. Bush vetoed the resolution-S.J. Res. 113, as being overly restrictive and "neither necessary to protect the interest of the United States, nor consistent with the Arms Export Control Act." Further, President Bush cited the resolution as containing provisions that "unconstitutionally infringe on the powers of the executive." [17]

On July 31, 1989, President Bush, in a lengthy letter to the Senate detailing the Legislative encroachment on the Constitutional authority of the Executive Branch, returned S.J. Res. 113 without signature. Congress subsequently failed to override the Presidents veto, and the FS-X policy memorandum of understanding, as modified by the Bush Administration, stands as the base U.S.-Japanese agreement on the FS-X.

### Conclusion.

Analytical focus in foreign affairs often presumes that governments are unitary actors proceeding rationally, weighing alternatives and selecting solutions which have maximum payoff. Graham Allison, in his article Conceptual Models and the Cuban Missile Crisis extends the

viewpoint that crucial decisions in international relations can be more effectively analyzed by including two additional modes to the "rational actor" model. Dr. Allison suggests that government actions can be further interpreted as outputs from large organizations, whose enormous size and bureaucratic complexity cause predictable responses which generally follow standard operating procedures. Additionally, Allison argues that individual leaders are players in a competitive game of bargaining, power brokering and compromise which also drives foreign policy outcomes.[18]

The stake holders in the FS-X debate, when tested against the Allison models, tend to support the thesis that policy development can be attributed to more than the rational actor mode.

The Department of Defense(DOD) and Department of State exhibited characteristics which fit category two- large bureaucracies whose decision outcomes were somewhat predictable. DOD never wavered in its pursuit of a stable security relationship with Japan. In the face of severe economic imbalances and possible vital technological transfer, DOD and State consciously separated emerging non-traditional security factors from the decision process.

While technically not a "bureaucracy" it can also be argued that American business acted predictably in the bureaucratic mode from the standpoint of profit motivation.

Analysis of the Executive Branch emphasizes personalities and power in the bargaining game that results in governmental action. Allison's third model concentrates on the President and a small group of players designated by Allison as "chiefs." While Robert Mossbacher and the Commerce Department were responsible for surfacing the technology transfer issue, it was no secret that Mossbacher had a personal stake

in what was considered an infringement on his area of responsibility by DOD. While President Bush was obviously influenced by Mossbacher's position on technology transfer, it would be imprudent to ignore the rising anti-Japanese sentiment that was articulated in U.S. polls as a factor in George Bush's decision to redress the MOU. Similarly, President Bush's reaction to Congressional encroachment on Executive Branch Constitutional powers could be reasonably expected and his veto seems consistent with that of a personally motivated actor.

Lastly, in my opinion, the position adopted by Congress was closest to the rational actor model. The broad spectrum of testimony provided at various committee hearings formed a basis to evaluate a variety of factors in establishing policy. In the end, support for constituents was replaced by broad national security concerns in shaping Congressional policy.

From the foregoing, it can be established that policy decisions do not readily follow expected structural, organizational, or personal influences, but are forged in complex relationships between various national level actors

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